

INTERNATIONAL SEARCH REPORT

International Application No
PCT/JP2005/008661

A. CLASSIFICATION OF SUBJECT MATTER

H01M8/02 H01M8/04 H01M8/06 H01M8/10

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

H01M

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practical, search terms used)

EPO-Internal, PAJ, WPI Data, INSPEC

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
A	US 2003/008186 A1 (DICKMAN ANTHONY J ET AL) 9 January 2003 (2003-01-09) page 9, paragraph 79 - paragraph 81; claims 1-15; figure 11	1-10
A	US 5 780 179 A (OKAMOTO ET AL) 14 July 1998 (1998-07-14) claims 1-19	1-10
P,A	US 6 740 432 B1 (SHIMANUKI HIROSHI ET AL) 25 May 2004 (2004-05-25) column 2, line 32 - line 57 column 4, line 7 - line 41; claims 1-6; figure 1	1-10
	----- -/--	

☒ Further documents are listed in the continuation of box C.

☒ Patent family members are listed in annex.

* Special categories of cited documents:

"A" document defining the general state of the art which is not considered to be of particular relevance

"E" earlier document but published on or after the international filing date

"L" document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified)

"O" document referring to an oral disclosure, use, exhibition or other means

"P" document published prior to the international filing date but later than the priority date claimed

"T" later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention

"X" document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone

"Y" document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art.

"&" document member of the same patent family

Date of the actual completion of the international search

10 November 2005

Date of mailing of the international search report

23/11/2005

Name and mailing address of the ISA

European Patent Office, P.B. 5618 Patentlaan 2
NL - 2280 HV Rijswijk
Tel. (+31-70) 340-2040, Tx. 31 651 epo nl,
Fax: (+31-70) 340-3016

Authorized officer

Wiedemann, E

INTERNATIONAL SEARCH REPORT

International Application No
PCT/JP2005/008661

C.(Continuation) DOCUMENTS CONSIDERED TO BE RELEVANT		
Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
A	US 2003/118881 A1 (WALSH MICHAEL M ET AL) 26 June 2003 (2003-06-26) page 3, paragraph 32 - paragraph 35; figures 1-3	1-10
A	PATENT ABSTRACTS OF JAPAN vol. 2002, no. 08, 5 August 2002 (2002-08-05) & JP 2002 124290 A (NISSAN MOTOR CO LTD), 26 April 2002 (2002-04-26) abstract	1-10

INTERNATIONAL SEARCH REPORT

Information on patent family members

International Application No

PCT/JP2005/008661

Patent document cited in search report	Publication date	Patent family member(s)	Publication date
US 2003008186 A1	09-01-2003	CN 1582197 A EP 1412073 A1 TW 548873 B WO 03002244 A1 US 2005208351 A1	16-02-2005 28-04-2004 21-08-2003 09-01-2003 22-09-2005
US 5780179 A	14-07-1998	JP 3553210 B2 JP 9017438 A	11-08-2004 17-01-1997
US 6740432 B1	25-05-2004	JP 2001006711 A	12-01-2001
US 2003118881 A1	26-06-2003	NONE	
JP 2002124290 A	26-04-2002	NONE	